

CEOS SEC 224 Report

Entity: WGDIsasters

Prepared By: Stéphane Chalifoux (Canadian Space Agency) and Simona Zoffoli (Italian Space Agency)

Updates on issues raised during the last CEOS SEC teleconference

(Dot points)

- NASA will take Vice-Chair (and Chair) of the WGDIsasters starting next Plenary.

Issues requiring discussion/decision during current CEOS SEC teleconference

(Dot points)

- None

Other highlights, activities, actions, projects, collaborations

(Dot points, e.g. outputs, new products, papers, technical reports, media, pipeline and new projects, interactions, project status changes, new opportunities)

- The Disaster Risk Management (DRM) pilot initiatives on floods, seismic hazards and volcanoes are in their final phase. The flood, seismic hazards and volcano pilots presented their draft final report at SIT-32 for comments that summarize lesson learned and preparing recommendations with a focus on the sustainability aspect. Final reports will request approval at CEOS Plenary in October. Regular provision of satellite data to Pilots and Supersites.
- Recovery Observatory (RO): Data request to the International Disasters Charter. Operational plan being drafted to be presented to CEOS this Fall for approval. User workshop (national and international stakeholders) will be held in Port-au-Prince in Haiti on May 30 - 31st. From needs expressed in the workshop, a capacity development plan will be developed.
- GEO-DARMA: First regional mission in Asia Pacific allowed meeting with UNESCAP and Asian Disaster Preparedness Center (ADPC).
- GP-STAR side event for the Global Platform session in Cancun will be on May 26. CEOS will be one of the 4 panellists in the side event to discussion on our activities and challenges. CEOS members are also invited to participate in the Market Place; GP-STAR is having a booth.

Upcoming meetings or events

(Dot points, e.g. meetings, conferences of relevance, visits)

- Global Platform for Disaster Risk Reduction, May 2017, Mexico, organized by The United Nations Office for Disaster Risk Reduction.
- GEO-DARMA Steering Committee and Concept Workshop (May 25, Cancun, Mexico)
- World Reconstruction Conference 3 (Brussels, 6-8 June, 2017)
- 8th CEOS WGDIsasters meeting, hosted by CONAE with NASA support, is in the final planning phase and is envisaged to be held in Buenos Aires, Argentina, from September 4 to 8, 2017.

Attachments

(e.g. pictures, figures, graphs, links – for use in overall CEOS reporting and as website resources etc.)

CEOS SEC 224 Report

Entity: WGISS (Working Group on Information System and Services)

Prepared By: Andrew Mitchell – Chair (NASA) / Mirko Albani Vice Chair (ESA)

Updates on issues raised during the last CEOS SEC teleconference

(Dot points)

- WGISS Vice Chair Nomination – Awaiting response from the CEOS agency which expressed interest in putting forward a nominee. They are considering the four-year commitment which would begin in Nov 2017.

Issues requiring discussion/decision during current CEOS SEC teleconference

(Dot points)

- None

Other highlights, activities, actions, projects, collaborations

(Dot points, e.g. outputs, new products, papers, technical reports, media, pipeline and new projects, interactions, project status changes, new opportunities)

- At the request of AMERIGEOSS, the CEOS WGISS Integrated Catalog (CWIC) team participated in the USGS Community for Data Integration (CDI) Workshop/API Plugfest in Denver, CO on May 15-17. During the workshop, attendees used geospatial Application Programming Interfaces (APIs) from the GEO Data Access Broker (GEODAB), NOAA, NASA, USGS, FEMA, EPA, USDA and CEOS (CWIC) to provide various data and service resources of selected thematic areas (Water, Environment, Agriculture and Hazards/Disaster) in the US Federal Geographic Data Committee (FGDC) Geoplatform.
- The 43rd WGISS plenary meeting was held on April 3-6 in Annapolis, MD. There was a one day Technology Exploration workshop on April 4th focusing on Future Data Access and Analysis Architectures and FDA related cloud computing topics. There was also another one day workshop on April 5th focusing on Global Earth Observation System of Systems (GEOSS) and WGISS interoperability as well as a session on capacity building and data democracy. There were over 60 attendees present representing 12 different international and national government agencies plus 6 different EO organizations.
- WGISS was invited to present at the GEO Data Providers workshop – April 20-21, Florence, Italy on the topic of GEO/GCI Success story of GCI-CEOS Interoperability Achievements. Richard Moreno attended and presented on how WGISS has made over 300 million CEOS data resources accessible to GEO via recent develops in the WGISS interoperable standards architecture with FedEO, CWIC and the IDN.
- WGISS agreed to co-lead the Moderate Resolution Sensor Interoperability (MRI) Metadata and Information System interoperability Initiative. WGISS will concentrate on the development of the metadata sections of the MRI Framework document and lessons learned at CEOS agencies represented at WGISS including metadata standards, and search and discovery.

Upcoming meetings or events

(Dot points, e.g. meetings, conferences of relevance, visits)

- WGISS 44 – September 25-29, 2017 Beijing, China
 - Hosted by Chinese Academy of Sciences

CEOS SEC Report

Entity: WGCapD

Prepared By: Phila Sibandze (SANSA) and Senthil Kumar (ISRO)

Updates on issues raised during the last CEOS SEC teleconference

(Dot points)

- NIL

Issues requiring discussion/decision during current CEOS SEC teleconference

(Dot points)

- Issue of Vice Chair.

Other highlights, activities, actions, projects, collaborations

(Dot points, e.g. outputs, new products, papers, technical reports, media, pipeline and new projects, interactions, project status changes, new opportunities)

- The Best practices documents which was circulated to all WGs, VCs, AHTs for their feedback is still under review..
- A joint collaboration between WGCapD and SAREDU hosted a three day ISRSE pre-conference SAR Training workshops in Pretoria (4-7 May 2017).
- WGCapD will have representatives in other WG who will report back on activities within those groups.
- CEOS WGCapD SAR workshop to be held at the University of Costa Rica 1-4 August 2017 during the AmeriGEOSS week.

Upcoming meetings or events

(Dot points, e.g. meetings, conferences of relevance, visits)

- Asian Conference on Remote Sensing 2017 is planned to be scheduled in October 2017 in New Delhi, India. This is one of the major RS events in Asia, and would like to invite participation from WGs, VCs, AHTs for their contribution.
- AfriGEOSS Symposium to be held in Ghana 13-15 June 2017, WGCapD has requested two of its members from South African and Gabon to be representatives at the symposium.

Attachments

Overall details for ACRS 2017: <http://acrs2017.org/>

CEOS SEC Report

Entity: WGCV

Prepared By: Kurtis Thome (NASA)/Cindy Ong (CSIRO)

Updates on issues raised during the last CEOS SEC teleconference

(Dot points)

- The Atmospheric Correction Intercomparison Workshop II took place at ESA ESRIN April 11-12 as part of the WGCV's ACIX Task team. A report from the activity is expected before the end of 2017 and results will be available on the CEOS Cal/Val portal once they are finalized. Many lessons were learned on how to improve the atmospheric correction schemes and the results pointed to the importance of per-pixel quality flags to ensure accurate atmospheric correction.
- A set of proposed activities to be undertaken by WGCV related to Moderate Resolution Interoperability have been forwarded to the MRI team for discussion during the team's upcoming telecon planned for early June. The activities will leverage work currently being done by WGCV subgroups that can be tailored for MRI.
- A description of the GSICS/WGCV IVOS proposed solar irradiance spectrum will be distributed to the WGCV membership for comment and approval as the WGCV accepted solar irradiance spectrum for distribution on the CEOS Cal/Val Portal. The spectrum is an update to the Thuillier Reference Spectrum 2003 that is currently on the portal.

Issues requiring discussion/decision during current CEOS SEC teleconference

(Dot points)

- None

Other highlights, activities, actions, projects, collaborations

(Dot points, e.g. outputs, new products, papers, technical reports, media, pipeline and new projects, interactions, project status changes, new opportunities)

- WGCV held a highly productive meeting May 16-19 in Sioux Falls, South Dakota with 22 attendees representing 15 agencies. One full day of the meeting was hosted at the EROS Data Center and included a welcome by CEOS Chair Frank Kelly as well as presentations and discussions on collaborations between WGCV and LSI-VC, MRI, and FDA. The meeting marked the initial one for the new SAR Subgroup Lead, Bruce Chapman from NASA/JPL.
- A schedule was outlined that leads to the opening of the RadCalNet website to the public in November 2017. Tentative approval was given by the WGCV for a process to accept test sites into RadCalNet and for opening the website for general use. Final approval of the method is awaiting a formal Terms of Reference for a RadCalNet admissions panel.
- Results presented by the LPV subgroup demonstrated significant progress on the WGCV's CARB-19 action in the CEOS Work Plan. The results are being formalized and are expected to allow closure of that action by September 2017 leading to likely closure of the Carbon Task Force's Action #08.

Upcoming meetings or events

(Dot points, e.g. meetings, conferences of relevance, visits)

- WGCV members will be presenting RadCalNet related material at the Newrad meeting June 13-16, 2017 in Tokyo, Japan and the Calcon meeting Aug. 22-24 in Logan, Utah
- Radiometric Calibration Workshop for European Missions is scheduled for Aug. 30-31, 2017 at ESA ESRIN.

Attachments

(e.g. pictures, figures, graphs, links – for use in overall CEOS reporting and as website resources etc.)

CEOS SEC Report

Entity: CEO

Prepared By: Jonathon Ross (CEO, Geoscience Australia)

Updates on issues raised during the last CEOS SEC teleconference

(Dot points)

- **CEOS Work Plan 2017-2019.** A draft of Version 1.1 of the Work Plan has been released for SEC comment. No comments on content received. One comment on structure, questioning whether COVERAGE deliverables should be included in the VC section (given they build on top of VC activity and integrate it) or whether perhaps a separate prefix in a COVERAGE sections under 'Other Initiatives' would be more appropriate. SEC comment sought.
- **CEO succession.** Agencies are invited to provide updates on any proposals that may be under consideration or development.

Issues requiring discussion/decision during current CEOS SEC teleconference

(Dot points)

- **GEO Plenary Delegation.** Agencies are reminded to indicate their planned presence at the GEO Plenary in Washington DC to support coordination. So far very few responses have been received. This does not need to be final names or numbers.
- **Work Plan Status Updates.** Following endorsement of V1.1 of the Work Plan final updates will be made to the Deliverables Tracker database by CEO and SEO. WGs and VCs will be asked to provide updates **prior to** their TagUps with the SIT Chair, so take this as a heads up. Requests for Non-VC/WG updates will be made at the same time, but direct to the relevant Entities rather than via the SIT Chair Team process.
- **COP Preparation.**

Other highlights, activities, actions, projects, collaborations

(Dot points, e.g. outputs, new products, papers, technical reports, media, pipeline and new projects, interactions, project status changes, new opportunities)

- **ISRSE.** A strong conference. Strong direct presence from CEOS, including in climate sessions, big space data sessions, space data access, and international coordination sessions. The value of CEOS was well recognised across the sessions, with direct references to CEOS in many presentations. The role of GEO was also prominent.
- **GEO Work Programme Symposium.** Attendance was relatively limited but the discussion was productive, with a focus on how to engage the community to deliver on the three key priorities identified by GEO Plenary (and by CEOS in Kyoto).
- **Blue Planet Symposium.** CEO will attend and present on Open Data Cube (and Digital Earth Australia) with a focus on potential for coastal applications, highlighting recently developed open source algorithms for ODC. A key goal is to mobilise the BluePlanet community towards developing "Cube-ready" products based on the methodologies/techniques that are being developed. Engaging GEO Initiatives to do this will make ODC a richer platform, including not just technical capability but practical tools that provide a 'starting point' for local customisation.

Upcoming meetings or events

(Dot points, e.g. meetings, conferences of relevance, visits)

- **Blue Planet Symposium.** CEO will attend the GEO Blue Planet Symposium in College Park, Maryland, USA.

Attachments

(e.g. pictures, figures, graphs, links – for use in overall CEOS reporting and as website resources etc.)

CEOS SEC 224 Report

Entity: SIT Chair Team

Prepared By: SIT team (ESA)

Updates on issues raised during the last CEOS SEC teleconference

(Dot points)

- None

Issues requiring discussion/decision during current CEOS SEC teleconference

(Dot points)

- None

Other highlights, activities, actions, projects, collaborations

(Dot points, e.g. outputs, new products, papers, technical reports, media, pipeline and new projects, interactions, project status changes, new opportunities)

- Several CEOS persons participated in both the ISRSE-37 Symposium (8-12 May 2017) and the 2017 GEO Work Programme Symposium (12-13 May 2017), in Tshwane (South Africa).
- The SIT team is working on the preparation of the SIT Technical Workshop and side-meetings (11-14 September 2017). In that scope, the second round of teleconferences between the SIT team and each one of the Working Groups and Virtual Constellation teams will start early June; so far only 3 groups out of 12 have indicated their preferred date & time to the SIT team.
- Eventually, the SIT Chair is representing CEOS this week at the GEO Programme Board meeting in Athens.

Upcoming meetings or events

(Dot points, e.g. meetings, conferences of relevance, visits)

- The 2nd GEO Programme Board meeting might be held on 23-24 May, in Athens (Greece).
- 40th GEO Executive Committee meeting, 11-12 July 2017, in Geneva (Switzerland)
- 2017 SIT Technical Workshop: 11-14 September 2017, at ESA ESRIN, in Frascati (Italy).

Attachments

(e.g. pictures, figures, graphs, links – for use in overall CEOS reporting and as website resources etc.)

CEOS SEC 224 Report

Entity: GEO SEC

Prepared By: Osamu Ochiai (GEO Secretariat)

Updates on issues raised during the last CEOS SEC teleconference

(Dot points)

- Not clear yet who from the GEO Sec will attend the calls after Osamu Ochiai left.

Issues requiring discussion/decision during current CEOS SEC teleconference

(Dot points)

- None

Other highlights, activities, actions, projects, collaborations

(Dot points, e.g. outputs, new products, papers, technical reports, media, pipeline and new projects, interactions, project status changes, new opportunities)

- ISRSE-37, Tshwane, May 8-12 2017
 - o GEO Secretariat co-designed the symposium with ISRSE-37 organizers best alignment with GEO Flagships, Initiatives and Foundational Tasks such as SDGs, Climate Change, In Situ and etc.
- GEO Work Program Symposium, May 12th and 13th 2017
 - o Good discussions on following topics:
 - *Strengthen alignment* of Work Programme (WP) activities with “3+1” priority areas (SDGs, Climate, Disaster Risk Reduction) + AfriGEOSS.
 - *Promote and enable collaborative interactions* (“clustering”) among WP activities to achieve priorities of the Strategic Plan and/or reorient activities to respond to gaps and avoid overlaps.
 - *Identify and set out approaches to address gaps* in areas such as data, user engagement, and capacity building, and suggest new analytic approaches, and demonstrate current and evolving tools for deployment in the SBAs.
 - *Serve as “capacity building effort” on major policy initiatives* (including governments, UN agencies, private sector, NGOs).
 - *Showcase GEO’s evolution to being more demand-driven* through the visibility of Flagships and key Initiatives, and thus more clearly demonstrate the added value of GEO.

Upcoming meetings or events

(Dot points, e.g. meetings, conferences of relevance, visits)

- May 23-24, 6th GEO Program Board, Athens, Greece
- May 31- June 2, 3rd Blue Planet Symposium, College Park, Maryland, USA
- June 13-15, AfriGEOSS Symposium, Sunyani, Ghana
- June 19-21, 11th GEO European Projects Workshop, Helsinki, Finland
- July 11-12, 40th GEO Executive Committee meeting, Geneva, Switzerland

Attachments

(e.g. pictures, figures, graphs, links – for use in overall CEOS reporting and as website resources etc.)

CEOS SEC-224 Report – May 2017

Entity: SEO

Prepared By: Brian Killough (NASA)

Issues requiring discussion/decision during CEOS SEC teleconference

- None

Updates on issues raised during the last CEOS SEC teleconference

- None

Upcoming meetings or events

- The SEO team is preparing for the 2017 IGARSS Conference in Fort Worth, Texas on July 23-28. The SEO will be leading a CEOS Open Data Cube workshop on the first day (4 hours, free of charge) and will be hosting a CEOS exhibition booth with a focus on Data Cube activities.

Other highlights, activities, actions, projects, collaborations

(e.g. outputs, new products, papers, technical reports, media, pipeline and new projects, interactions, project status changes, new opportunities)

- The SEO team is actively engaged in the Open Data Cube initiative. Recent advancements and work include: development of a governance plan for the open source software site, development of new website content (www.opendatacube.org), review and development of documentation, enhancements to the Amazon user interface, validation testing of change detection (PyCCD) and landslide detection (SLIP) algorithms, and a new student project to develop a water detection algorithm for Sentinel-1. There are currently 3 operational country-level data cubes (Australia, Colombia, Switzerland), 2 in development (Vietnam, USA), and 17 more under review or expressing interest.

CEOS SEC Report

(two pages max.)

Entity: SDCG for GFOI

Prepared By: George Dyke (SDCG SEC)

Updates on issues raised during the last CEOS SEC teleconference

(Dot points)

- None.

Issues requiring discussion/decision during current CEOS SEC teleconference

(Dot points)

- None.

Other highlights, activities, actions, projects, collaborations

(Dot points, e.g. outputs, new products, papers, technical reports, media, pipeline and new projects, interactions, project status changes, new opportunities)

- There has been some recent discussion around CEOS representation on the GFOI Methods and Guidance (MGD) Advisory Board which is being reinvigorated as GFOI Phase 2 is initiated, and space agency representation is being encouraged by SDCG.
- A deforestation early warning activity for GFOI ('GFOI ALERT') is being discussed amongst the GFOI Leads and SDCG EXEC. This activity would seek to improve coordination and achieve better outcomes for the many countries and donors who are implementing or seeking to implement 'early warning' functions for their forest monitoring capabilities and systems. While discussions are still quite preliminary, this may be a positive way for CEOS functionally as part of GFOI Phase 2, and in support of the other GFOI components. This activity would also take advantage of the Data Cube, supported by the CEOS SEO.

Upcoming meetings or events

(Dot points, e.g. meetings, conferences of relevance, visits)

- SDCG-11 will take place 5-8 September at ESA/ESRIN as a part of the joint LSI-VC / SDCG / GEOGLAM meetings.
- The 2018 GFOI Plenary is being planned for Q1 2018, likely early March, and possibly in Colombia.

Attachments

(e.g. pictures, figures, graphs, links – for use in overall CEOS reporting and as website resources etc.)

CEOS SEC Report 224

(two pages max.)

Entity: CEOS ad hoc WG on GEOGLAM

Prepared By: Alyssa Whitcraft (GEOGLAM Sec)

Updates on issues raised during the last CEOS SEC teleconference

(Dot points)

- None.

Issues requiring discussion/decision during current CEOS SEC teleconference

(Dot points)

- More an FYI than requiring discussion: GEOGLAM's Implementation Team will hold a 2.5 day meeting hosted by AMIS at FAO in Rome, 19-21 June 2017. This working meeting is expected to result in formalization of roles and responsibilities for the program, a plan for how to continue as nearly all partners funding situations are in flux, and will include a focused discussion on what GEOGLAM will aim to accomplish in the next 18-24 months. This will likely have some influence on activities with CEOS, including our commercial engagement strategy as well as potentially data coordination requests as we potentially return to a "phased implementation" approach (TBD!).

Other highlights, activities, actions, projects, collaborations

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- GEOGLAM will be represented at the Agriculture and Earth Observation conference, convened by the Netherlands Space Office, in early July via three separate presentations: One by Selma Cherchali (CNES), one by Sven Gilliams (VITO), and one by Catherine Bamps (DG GROW), with whom Guido Lemoine (JRC) will coordinate. Alyssa Whitcraft has sent materials to Selma Cherchali and Brad Doorn to prepare, and has sent the same to Sven Gilliams as well, encouraging him to coordinate with Selma to ensure messages are complementary but not duplicative. This is very good exposure for science-based EO requirements for agriculture monitoring.
- GEOGLAM POC Whitcraft has made contact with Carbon contact (Mark Dowell) regarding LSI-VC action to adapt GEOGLAM requirements process for carbon community, thanks to Brian Killough intervention. Hopes are for some initial progress before the joint LSI-VC/GEOGLAM/GFOI session in September, acknowledging individual summer schedules may complicate this.
- GEOGLAM Program Coordinator Michel Deshayes is retiring in September 2017, and GEOGLAM Sec is actively seeking a Program Director.

Upcoming meetings or events

(Dot points, e.g. meetings, conferences of relevance, visits)

- Next CEOS Ad Hoc WG for GEOGLAM Meeting still planned along LSI-VC in September 2017 at ESRIN.

Attachments

(e.g. pictures, figures, graphs, links – for use in overall CEOS reporting and as website resources etc.)

CEOS SEC-224 Report – May 2017

Entity: FDA Ad-hoc Team

Prepared By: Steve Labahn (USGS), Nick Hanowski (ESA), Alex Held (CSIRO)

Updates on issues raised during the last CEOS SEC teleconference

- None

Issues requiring discussion/decision during current CEOS SEC teleconference

- None

Other highlights, activities, actions, projects, collaborations

(e.g. outputs, new products, papers, technical reports, media, pipeline and new projects, interactions, project status changes, new opportunities)

- At SIT-32, CEOS endorsed ‘what’ CEOS agencies should do together:
 - Pursue CARD4L interoperability (optical and SAR)
 - Develop interoperable open source tools (Open Data Cube)
 - Capture user feedback and user statistics
 - Implement standardization when necessary
 - Accommodate analytical processing capabilities (longer term goal, standardization is an enabler)
- Prepared initial FDA ‘how’ and ‘when’, which is now circulating amongst the FDA AHT Co-Leads
- Scheduling next FDA AHT meeting for the week of 29 May

Upcoming meetings or events

(e.g. meetings, conferences of relevance, visits)

- FDA AHT Meeting: Week of 29 May 2017
- CEOS SIT Technical Workshop: 11-14 September 2017
- CEOS Plenary-31: 18-20 October 2017

Attachments

(e.g. pictures, figures, graphs, links – for use in overall CEOS reporting and as website resources etc.)

CEOS SEC Report

Entity: Moderate Resolution sensor Interoperability Initiative (MRI)

Prepared By: Gene Fosnight (USGS)

Updates on issues raised during the last CEOS SEC teleconference

(Dot points)

- None

Issues requiring discussion/decision during current CEOS SEC teleconference

(Dot points)

- None

Other highlights, activities, actions, projects, collaborations

(Dot points, e.g. outputs, new products, papers, technical reports, media, pipeline and new projects, interactions, project status changes, new opportunities)

- The first complete draft of the framework document was distributed to the MRI Team for edits and comments on 9 May.
- A survey is underdevelopment to learn more about the current state of interoperability research and development within the extended CEOS community.
- The CEOS WGCV meeting was held at USGS EROS from 15-19 May. A decision to focus on the development of methodologies to determine uncertainties associated with Level 1 and higher level products to facilitate user assessment of multi-sensor data streams for their specific applications.
- The next MRI call will be held in late May or early June.

Upcoming meetings or events

(Dot points, e.g. meetings, conferences of relevance, visits)

- LSI-VC-4 (Frascati, Italy, 5-8 September 2017)
- SIT-TW (Frascati, Italy, 11-14 September 2017)

Attachments

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